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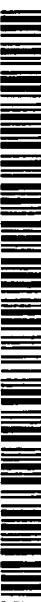
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(54) Title: GENES ENCODING ENZYMES IN THE BIOSYNTHESIS OF PIMARICIN AND THE APPLICATION THEREOF



A1

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Genes

3.3 0.7

Chromosome

Probes

Cos 9

Cos 37

Cos 41

Cos 63

Cosmids

(57) Abstract: A polynucleotide comprises the nucleic acid sequence set out in SEQ ID NO: 5, 7 or 9 or a homologue or fragment thereof or a sequence complementary thereto. Polynucleotides of the invention may be used for modifying the biosynthesis of pimaricin and also in the biosynthesis of new compounds.

# INTERNATIONAL SEARCH REPORT

Internat'l Application No  
PCT/06227

A. CLASSIFICATION OF SUBJECT MATTER				
IPC 7	C12N15/53 C12N15/52	C12N9/02	C12N9/04	C12P19/62

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)  
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Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, STRAND, EMBL

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	<p>APARICIO ET AL.: "The biosynthetic gene cluster for the 26-membered ring polyene macrolide pimaricin. A new polyketide synthase organization encoded by two subclusters separated by functionalization genes"            JOURNAL OF BIOLOGICAL CHEMISTRY,            vol. 274, no. 15,            9 April 1999 (1999-04-09), pages            10133-10139, XP002120719            page 10134, column 2; figure 2            page 10137, column 2            ---            -/-</p>	1-13, 15-27

Further documents are listed in the continuation of box C.

Patent family members are listed in annex.

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## INTERNATIONAL SEARCH REPORT

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## C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 95 01098 A (MONSANTO CO) 12 January 1995 (1995-01-12)  page 15, line 25 -page 16, line 29 page 16, line 15 - line 29 page 19, line 23 -page 24, line 31 seq id no 8 page 30 -page 32 table 3	1-6,12, 13,15, 17,20, 21,23-27
X	US 5 672 497 A (COX KAREN L ET AL) 30 September 1997 (1997-09-30)  column 9, line 35 - line 64; figure 1; table 11	1-7,9, 10,12, 13, 15-17, 19-21, 23-27
A	WO 98 11230 A (SQUIBB BRISTOL MYERS CO) 19 March 1998 (1998-03-19) seq id no 22 page 25, line 9 -page 27, line 30; claims 1-27; table 1	1-27
P,X	BRAUTASET ET AL: "Biosynthesis of the polyene antifungal antibiotic nystatin in Streptomyces noursei ATCC 11455: analysis of the gene cluster and deduction of the biosynthetic pathway" CHEMISTRY AND BIOLOGY, vol. 7, no. 6, 23 May 2000 (2000-05-23), pages 395-403, XP000953274 nysL page 401 -page 402; figure 4; table 2 & DATABASE EMBL 'Online' EBI; ACC.NO.:AF263912, 25 May 2000 (2000-05-25) BRAUTASET ET AL.: "Streptomyces noursei ATCC 11455 nystatin biosynthetic gene cluster, complete sequence" XP002151299 nysL abstract	1-6,12, 13,24-27

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